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COMMISSION ON SUSTAINABLE DEVELOPMENT

Intergovernmental Forum on Forests

Third session
Agenda item ...

Letter dated 21 April 1999 from the Permanent Representatives of Chile, Denmark, India, New Zealand and Portugal to the United Nations addressed to the Secretary-General

New York, 21 April 1999

Sir,

On behalf of Chile, Denmark, India, New Zealand and Portugal, the countries sponsoring the International Expert Meeting on the Role of Planted Forests in Sustainable Forest Management, held in Santiago, Chile, from 6 to 10 April 1999, we have the honour to transmit to you the final report of the Meeting.

The purpose of this initiative is to support the discussion on this topic in the United Nations Intergovernmental Forum on Forests (IFF).

Please circulate this letter and the attached report as an official document at the third session of the Intergovernmental Forum on Forests, to be held at Geneva from 3 to 14 May 1999.

Juan Larrain
Ambassador
Permanent Representative of Chile
to the United Nations

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United Nations, New York

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'ROLE OF PLANTED FORESTS IN SUSTAINABLE FOREST MANAGEMENT'

Report of the

INTERNATIONAL EXPERT MEETING

April 6 - 10 1999, Santiago, Chile

Sponsored by the Governments of Chile, Denmark, India, New Zealand and Portugal

This report is dedicated to the memory of

Alvaro Branco Vasco
former Director General of Forests
Portugal

who played a key role in convening this Expert Meeting on the Role of Planted Forests.

His tragic death in January 1999 prevented him from seeing the fruits of his efforts.

EXECUTIVE SUMMARY

The governments of Chile, Denmark, India, New Zealand and Portugal sponsored an international meeting of experts entitled "The Role of Planted Forests in Sustainable Forest Management" to support the Intergovernmental Forum on Forests (IFF) in implementing actions to promote sustainable forest management. Eight invited papers and case studies formed the basis of deliberations held in Santiago, Chile from 6-10 April 1999.

The international experts meeting was attended by 74 participants from 31 countries from all regions representing governments as well as the private sector, international and non-governmental organisations. The meeting made the following recommendations for further deliberation by the IFF:

(i) Countries should recognise that the boundary between planted and natural forests is often indistinct. The roles fulfilled by planted forests are diverse, and a continuum of forest types exists from highly protected conservation forests to productive, short rotation planted forests.

(ii) When considering the definition of planted forests, the international community, especially FAO, and individual countries should take into account the need to reflect both the differing degrees of management as well as the different objectives of planted forests.

(iii) To promote policies to reduce unsustainable consumption of forest products in developed countries, focussing on reduction, reuse, recycling and eco-efficiency, while recognising the environmental acceptability of many wood products compared with some alternatives. Efficient and sustainable utilisation should be encouraged in all countries.

(iv) To promote policies to increase forest area, by planted forests and other means, including trees on farms, in order to meet the rising demand for wood, non-wood forest products and services including carbon sequestration.

(v) To note IPF recommendation 58.b.ii "taking all practicable steps to avoid replacing natural ecosystems of high ecological and cultural values with forest plantations, ... and preferring native species, where appropriate".

(vi) To encourage countries, especially with low forest cover, to use planted forests and other means, including trees on farms, as an option for rehabilitating degraded areas and, where possible, as a basis for re-establishing natural forests.

(vii) To encourage the use of environmental impact assessments and other tools to facilitate the development and implementation of sound land-use decisions.

(viii) To take due consideration of environmental, economic, and social principles of SFM, at appropriate levels, in the planning and management of planted forests.

(ix) To encourage the development of strategies utilising planted forests, where appropriate, for the conservation and management of forest genetic resources. The utilisation of reproductive material of high genetic quality should also be encouraged.

(x) To urge countries to involve stakeholders effectively in decision making and policy implementation relating to planted forests.

(xi) To request FAO to undertake quantitative studies on the supply and demand for fuel wood, fodder and non-wood forest products and to continue to support countries in capacity building.

(xii) To urge countries to engage in awareness raising of the ecological, social, cultural and economic roles that planted forests may fulfil, and their impacts.

(xiii) To encourage appropriate two-way technology transfer mechanisms for the sustainable development of planted forests. In addition, appropriate means to ensure the sharing of technologies between and within countries should be developed, including effective links between research, extension and implementation.

It is hoped that these important conclusions and recommendations will go beyond the Intergovernmental Forum on Forests including further consultation on the role of planted forest in sustainable forest management

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'ROLE OF PLANTED FORESTS IN SUSTAINABLE FOREST MANAGEMENT'

REPORT OF THE

INTERNATIONAL EXPERT CONSULTATION
April 6 - 10 1999, Santiago, Chile.

1. BACKGROUND

The United Nations Conference on Environment and Development (UNCED) held in Rio de Janeiro in 1992 recognised the significance of planted forests in sustainable forest management.

Subsequently, the Intergovernmental Panel on Forests (IPF), established in 1995 under the UNCSD to progress the implementation of actions towards sustainable management, made a number of proposals for action relating to planted forests. These are documented in the final report of the IPF (see Report E/CN.17/1997/12).

The Intergovernmental Forum on Forests (IFF) succeeded the IPF in 1997. Part of the mandate of the Forum is to promote and facilitate the implementation of the proposals for action made by the IPF, and to make further recommendations on a number of pending issues needing further clarification. Several issues on the agenda of the IFF are related to planted forests.

1.1 Expert Meeting on the Role of Planted Forests in Sustainable Forest Management

Although the important role the planted forests play in sustainable forest management was recognised by the UNCED, the IPF and the IFF, the matter has not been addressed comprehensively within the framework of the intergovernmental dialogue on forests. It was to fill this gap that the governments of Chile, Denmark, India, New Zealand, and Portugal sponsored the Expert Meeting on the Role of Planted Forests in Sustainable Forest Management in Santiago, Chile from 6-10 April 1999.

The meeting was attended by 74 participants from 31 developed and developing countries representing governments as well as several international organisations, ten environmental non-government organisations, and a number from the private sector.

The overall purpose of the meeting was to assist the IFF in recognising and enhancing the role of planted forests as an important element of sustainable forest management complementary to natural forests. The meeting specially addressed underlying causes of deforestation, needs and requirements of countries with low forest cover, future supply and demand for wood and non-wood forest products, rehabilitation of degraded forest lands and other relevant issues.

Furthermore, the meeting had as an objective the expert consultation contributing to identifying options and priorities for further enhancing quantity and quality of goods and services provided by planted forests within the context of sustainable forest management and to building consensus through a more informed dialogue among major interest groups.

The present report from this expert meeting is intended to assist the IFF in its deliberations on issues related to planted forests. The report is structured on the same basis the IPF and the IFF have categorised its work so that the output from the expert meeting relating to planted forests could be easily linked. At the same time, it was recognised during the expert meeting that a number of important issues relating to planted forests are not adequately addressed in the agenda of the IFF. Conclusions and recommendations on these issues are included for the attention of the IFF.

2. THE ROLE OF PLANTED FORESTS IN SUSTAINABLE FOREST MANAGEMENT

2.1 Introduction

All forests fulfil a range of roles and provide a variety of goods and services. The roles fulfilled by planted forests are diverse and the goods and services produced include the production of industrial wood, fuel wood, non-wood forest goods (eg. animal fodder, apiculture, essential oils, tan bark, cork, latex, food), and conservation, carbon sequestration, recreation (eg. hunting, fishing, hiking), erosion control and rehabilitation of degraded lands, including landscape and amenity enhancement. For countries with a low forest cover, the only way to obtain the multiple benefits from forests, is creating new forests, mainly through planting.

The variety of roles of planted forests has resulted in a diverse set of management practices and ecosystems. As a result, a continuum exists from highly protected conservation forests to productive, short rotation planted forests and the boundary between planted and natural forests is often indistinct. This prevents a highly prescriptive definition of plantations from being used.

At the same time, circumstances of each country vary with differing economic, social, cultural and other critical aspects that bear on forestry. As such, it is unrealistic to expect a single policy prescription relating to forests to apply in all countries. Any measure, which ignores different country situations, is likely to fail.

Different management objectives and practices are used to deliver the variety of goods and services required. For example, the management objectives of a forest planted with wood production as a primary goal will differ substantially from a planted forest which has erosion control as its principal objective.

2.2 Future Supply and Demand of Wood and Non-Wood Forest Products (Programme element II.d: E/CN.17/IFF/1999/14 items II 9b, 9c, 9d, 10c, 42, 49a, 51c)

2.2.1 Reduction in unsustainable consumption

Considering that many planted forests are concerned with production, the meeting noted that eradicating poverty and changing unsustainable consumption and production patterns are a priority of international and national sustainable development policies. Effective policies to reduce unsustainable consumption of forest products in developed countries are required, focussing on approaches such as reduction, reuse, recycling and eco-efficiency. It is recommended that these strategies should avoid the substitution of forest products by less sustainable alternatives such as concrete, steel and aluminium.

Policies to change consumption patterns should be based on a full life cycle assessment of both forest products and their alternatives.

2.2.2 Requirement for planted forests

Despite recycling and other efforts to reduce consumption, most participants considered that the demand for industrial wood, fuel wood and non-timber forest products and services, will increase considerably in the future. The world's present wood production capacity cannot meet this requirement. Planted forests are seen as the only economically viable and environmentally safe means of meeting these requirements.

In addition to meeting increased demand, planted forests can also assist in addressing underlying causes of deforestation in particular in the recovery of degraded lands, increase the extent of forests in countries with low forest cover and deliver valuable non-wood services, such as carbon sequestration. Most participants considered that a substantial increase in the area of planted forests, in the order of 100 million hectares, will be needed over the next 50 years to meet the needs of the increase in population assuming that the current per capita levels of consumption will remain unchanged. However, no consensus was reached on this figure. Current programmes suggest that Asian countries will provide most of the additional area.

Alternatively, some participants argued that increased planting was not required. They considered that stronger efforts should be made to reduce wood consumption and to look for alternative energy sources, allowing the environmentally safe substitution of wood products.

The point was made that the importance of the predicted increase was more to recognise this need in considering global sustainable forest management options rather than to agree on a required hectarage of new planting. Regardless of whether or not there is increased planting, comprehensive Life Cycle Analyses are required to reinforce the position of wood as an environmentally friendly low energy alternative to steel, concrete and aluminium and to encourage the replacement of these products by wood.

2.2.3 Sustainable Forest Management objectives

It was agreed that all sustainable forest management objectives should be met at the national level but participants could not agree on the extent to which all objectives should be met at the landscape and forest management unit levels. Criteria and indicators fulfil an important role in the assessment of sustainable forest management although different indicators may need to be applied depending on the management objectives and the level of application under consideration. Management plans should clearly specify the major objectives of the planted forest and take into account agreements reached at the national and global levels, such as the Statement on Forest Principles, legally binding conventions, the IPF proposals for action and criteria and indicators for sustainable forest management.

Certification was seen as a useful means, among others, of communicating the attainment of sustainable forest management to the market and the community. It was widely considered that land use planning, public consultation and environmental impact assessment were important mechanisms for the achievement of sustainable forest

management. Other significant considerations are the use of relevant codes of practice and codes of ethics which are accepted by stakeholders and the sector.

2.2.4 Ecological stability

A continuum exists between planted forests and natural forests. However, the greater biological diversity of natural forests and their structural features will tend to promote ecological stability. The ecological stability of all forests is under pressure from accidental or deliberate introduction of alien species, forest fires and climate change. New threats will inevitably arise over time but the history of planted forests suggests that these risks may be adequately contained by the use of sound silvicultural practices complemented by monitoring, research and effective bio-security.

2.2.5 Fuel wood, fodder and non-wood forest products

Globally more than half the wood supply consists of fuel wood. In developing countries, even conservation forests located close to human settlements are often degraded by people collecting fuel wood and other essential supplies. Any durable solution to this problem should involve the creation of adequate fuel wood supplies in accessible locations.

In order to successfully implement suitable policies, all stakeholders should be involved in decision making and implementation. Cultural, economic, social and other circumstances also require consideration when designing effective policy measures.

Basic needs of local communities, should be given priority in the social, economic and environmental considerations of sustainable forest management. In developing countries fuel wood, fodder and non-wood forest products are often a priority for local communities. In developed countries, recreation opportunities, other environmental services and rural employment are often important concerns. Planted forests can play a significant role in providing these opportunities for local communities.

Despite its significance in global wood consumption, there is a dearth of quantitative information on fuel wood availability and use. The participants concurred that the availability and credibility of data on industrial wood products was significantly better that for fuel wood, fodder and non-wood forest products. FAO was strongly recommended to undertake quantitative studies on the supply of and demand for these latter products. FAO was also encouraged to continue to support countries in capacity building so that improved data are made available nationally and globally.

2.3 Underlying causes of Deforestation and Forest Degradation (Programme element II.d.1: E/CN.17/IFF/1999/7 item 39)

Two of the principal causes of deforestation are the clearing of forest land for agriculture and the harvesting of natural forests for the provision of goods and services. The meeting noted that planted forests fulfil a complementary role to natural forests in the achievement of sustainable forest management and endorsed an enhancement of the provision of goods and services from planted forests. Countries should be encouraged to develop policies that avoid replacing natural ecosystems of high ecological and cultural values with forest plantations and, where appropriate, native species should be preferred. In addition, increased coordination

between the implementation of agricultural and forestry policies was considered to be an important means of addressing some of the driving forces behind deforestation.

2.4 Assessment, Monitoring and Rehabilitation of Forest Cover in Environmentally Critical Areas (Programme element II.d.8: E/CN.17/IFF/1999/9 items 8, 9, 47,48,49)

2.4.1 Transitional forestry for the rehabilitation of degraded land

Planted forests have an important role to play in the rehabilitation of degraded land. These forests may initially consist of a restricted set of species able to survive the initial conditions. Subsequently, a species transition may be achieved to mimic the indigenous forest ecosystem. In such circumstances, planted forests are considered to be a transitional phase to the re-establishment of natural forests.

The need for a such a transition depends on country circumstances, the national forestry goals, and socio-economic conditions in the country. Not all countries have the same forestry objectives, similar resources, or the same social and community pressures on forestry. Country needs will largely determine whether the transitional concept is an appropriate approach but it may be especially important where forest cover is low.

2.4.2 Increase in forest cover

Planted forests are an important means of increasing forest area in countries with low forest cover. Planted forests are able to enhance the provision of a wide range of goods and services including production of wood and non-wood forest products, conservation, carbon sequestration, and erosion control in addition to the rehabilitation of degraded lands considered above. When planted forests are established, all practicable steps should be taken to avoid replacing natural ecosystems of high ecological and cultural value. In many countries, the establishment of trees on farms is an important means of ultimately increasing the area of forest cover. In order to achieve equitable and effective outcomes, indigenous and local communities, land owners and other stakeholders need to be involved in the decision making process.

2.5 Transfer of Environmentally Sound Technologies to Support Sustainable Forest Management (Programme element II.c: E/CN.17/IFF/1999/6 items 4f, 4h, 5a, 5b, 5c, 5d, 5e, 5g, 5j, 5k, 5l)

Technology transfer was considered to be a critical, but complex, issue for the effective development of planted forests. Technology transfer should have the clear objective of transferring appropriate and proven technologies that match the needs of the beneficiaries. A two way flow of information was considered to be essential for effective technology transfer.

An effective link between research and extension is an important element in the transfer of information and technology. Most participants agreed that there were significant impediments to the flow of new information and technology to the end-user. Programmes are needed to increase the capability of extension workers through better education and training.

In addition, appropriate mechanisms should be developed to ensure transfer of technologies within and between countries. Extensive information and technologies exist on development

options for different types of planted forests, but they are unevenly distributed. Developing suitable methods for the transfer of this information to the areas of greatest need would be an important mechanism for increasing the effectiveness of planted forests establishment and management. It would also raise the awareness of the ecological, social, cultural and economic roles that planted forests may fulfil.

2.6 Specific Issues relating to Planted Forests

2.6.1 Definition of planted forests

Traditionally, forests have been defined as either natural or planted depending on a number of factors including method of establishment, management intensity and nature of the species used. With the inclusion of non-wood forest product values to the management objectives of many planted forests and with the initiation of management practices in many of the natural forests, the distinction between natural and planted forests is more difficult to make. The meeting noted that there is a continuum of forest types and that the boundary between planted and natural forests is often indistinct. FAO, and other national and international organisations, were encouraged to consider these issues when establishing definitions.

2.6.2 Education and transfer of information

The public and other stakeholders require a better understanding of the ecological, social and economic roles that planted forests may fulfil. A two-way flow of information is essential in order to achieve effective communication between stakeholders and managers of planted forests. This communication should be flexible and creative. Forest managers should strive to be responsive to a range of views, including traditional forest related knowledge. They should acknowledge that a variety of approaches to managing forests are possible and that stakeholders need to understand the advantages and disadvantages of the various management options.

2.6.3 Involvement of stakeholders in decision making

Indigenous and local communities, land owners, industry and other stakeholders need to be involved in decision making in order to achieve equitable and effective policy decisions and their implementation. This is particularly important with any land use change new planted forests may bring. In this way, stakeholder consultation may result in policies that reflect the needs of local communities and individual nations. A variety of mechanisms may be used to foster dialogue between parties. Formal agreements and transparency will facilitate stakeholders' participation, but differences between countries and local conditions should also be acknowledged.

The following two issues should be considered when developing both national and local policies :

(i) the legal, customary and cultural rights of communities should be defined ;

(ii) adequate access to wood and non-wood forest products should be ensured.

2.6.4 Sound land-use decisions

Population growth, urbanisation, decreasing commodity prices and regulations impact on land use decisions in most countries. These decisions may have a significant impact on the roles that planted forests may fulfil within a country, such as the production of wood products, fuel wood, non-wood products, rehabilitation of degraded land and the production of other goods and services such as recreation and carbon sequestration. The development and implementation of rational land-use decisions should be encouraged so that the optimal use of the available land is achieved. The linking of agricultural and forestry policies and the use of environmental impact assessments, and other tools, were highlighted as important mechanisms for attaining this goal. The involvement of both the local people and the land owners in decision making was common concern.

2.6.5 Ownership

Participants agreed that ownership patterns affect the outcomes achieved by planted forests and that the management objectives of the government and private sector differed. In general, governments are reducing their ownership of planted forests and are focussing on the development of forestry and environmental policies. The involvement of stakeholders in these processes is an important issue. Most participants agreed that governments should be less involved in the direct management of planted forests for wood production but should create the right environment for the private sector to operate efficiently. However, important governmental roles remain in the development of forests for land rehabilitation, soil conservation and fuel wood production.

2.6.6 Biodiversity, landscape and hydrology

Biodiversity, landscape and hydrology have been points of concern for planted forests. Some participants considered that these points could be addressed by appropriate planning and management of planted forests. For example, if planted forests were appropriately sited and managed in relation to indigenous forests and agricultural lands, these issues could be managed adequately at the landscape level. Other participants considered that these issues needed to be addressed at the management unit level and, consequentially, biodiversity, landscape and hydrology become part of forest design and each forest operation.

2.6.7 Conservation of forest genetic resources

It is essential to conserve forest genetic resources. In many countries, support for the conservation of genetic resources is decreasing and innovative strategies are required to ensure adequate resourcing. Options include concentrating government support on long term research and development, expanding areas for protection of biodiversity and public-private partnerships and increased cooperation among countries. Planted forests may contribute to conservation through the reintroduction of species, the maintenance of genetic variability, and release of land for conservation purposes.

2.6.8 Genetic improvement

Benefits from genetic improvement can be derived without sacrificing genetic diversity. While the use of appropriate and sound genetic material should be strongly encouraged, genetic improvement should primarily focus on conventional approaches, but should also be open to new developments such as biotechnological methods. Given the ethical, environmental, and sustainability issues, genetic diversity issues, and public concerns over the uncertainties and risks of genetically modified organisms, prudence is needed in pursuing

biotechnological approaches. However, the potential benefits of biotechnology should be explored.

National and/or international regulatory regimes are likely to have a significant effect on the development and application of advanced genetic modification technologies. Informed decisions on the application of biotechnology can be made through effective consultation with appropriate stakeholders and based on clear scientific understanding of associated risks and benefits.

The number of species incorporated in tree improvement programmes should be guided by many considerations, including the needs of the population and industry, national capacity, and potential risks and opportunities. These factors, together with the available technologies and international technical cooperation, should guide the prioritisation of species selection for improvement. Tree improvement should aim to achieve higher productivity without sacrificing long-term ecosystem stability and flexibility. The utilisation of reproductive material of high genetic quality should also be encouraged.

3. CONCLUSIONS

Context

3.1 Multiple roles of planted forests

All forests produce goods and services. The roles fulfilled by planted forests are diverse and include production of industrial wood, fuel wood, non-wood forest products and conservation, recreation, landscape enhancement and amenity, carbon sequestration, erosion control and rehabilitation of degraded lands. As a result, a continuum exists from highly protected conservation forests to productive, short rotation planted forests and the boundary between planted and natural forests is often indistinct. This prevents a highly prescriptive definition of planted forests from being used.

3.2 Reduction in unsustainable consumption

Effective policies to reduce unsustainable consumption of forest products in developed countries are required, focussing on approaches such as reduction, reuse, recycling and eco-efficiency. It is recommended that these strategies should avoid the substitution of wood by less sustainable alternatives such as concrete, steel and aluminium. It is recognised that wood, especially solid wood, is environmentally friendly. Policies to change consumption patterns should be based on a full life cycle assessment of wood products and their alternatives.

Role of Planted Forests

3.3 Requirement for planted forests

Despite recycling and other efforts to reduce unsustainable consumption, most participants considered that demand for industrial wood and fuel wood, as well as for non-wood forest products and services, including carbon sequestration, will increase considerably in the future. The world's present forested area cannot meet these requirements. In the view of most participants, planted forests are seen as the only economically viable and environmentally acceptable means of achieving these objectives.

3.4 Needs of local communities

Basic needs of local communities, should be given priority in the social, economic and environmental considerations of forest planning for sustainable development. In developing countries these generally include fuel wood, fodder and non-wood forest products, and in developed countries such things as rural employment. Planted forests can play a significant role in providing these opportunities.

3.5 Transitional forests

Planted forests can play an important role in the rehabilitation of degraded land and as a transitional phase in the re-establishment of natural forests. Country needs will largely determine whether the transitional concept is an appropriate approach.

3.6 Ecological stability

There is a continuum between planted forests and natural forests. The biological diversity of natural forests will tend to promote ecological stability. New threats to all forests will inevitably arise over time. Experience with planted forests suggests that these risks may be adequately contained with sound silviculture complemented by monitoring, research and effective bio-security.

3.7 Conservation of forest genetic resources

It is essential to conserve forest genetic resources and to develop a combination of innovative strategies to maintain support, such as concentrating government assistance on long-term research and development, expanding areas for protection of biodiversity, and public-private partnerships. Planted forests can contribute to conservation through the reintroduction of species, maintenance of genetic variability, and release of land for conservation purposes.

3.8 Genetic improvement

The use of appropriate and sound genetic material should be strongly encouraged. Genetic improvement should primarily focus on conventional approaches, but it is prudent to be open to new developments such as biotechnological methods. Informed decisions on the application of biotechnology can be made through effective consultation with appropriate stakeholders and based on clear scientific understanding of associated risks and benefits. National and/or international regulatory regimes are likely to have a significant effect on the development and application of advanced genetic modification technologies. The number of species incorporated in tree improvement programmes should be guided by considerations such as national objectives and capacity, the needs of the population and industry, and potential risks and opportunities.

Planted Forests and Wider Issues

3.9 Stakeholder participation

Indigenous and local communities, land owners, industry and other stakeholders, need to be involved in the decision making process in order to achieve equitable and effective policy decisions and their implementation. Particular attention should be given to the involvement of women and the poor.

3.10 Achievement of sustainable forest management

It was agreed that all SFM principles should be met at the national level but not all participants agreed to what extent all objectives should be met at landscape and forest management unit levels in planted forests. Criteria and indicators fulfil an important role in the assessment of sustainable forest management and certification could be a useful means, among others, of communicating its attainment.

3.11 Sound land-use decisions

The use of environmental impact assessments and other tools should be encouraged to facilitate the development and implementation of sound land-use decisions so that the optimal and sustainable use of the available land is achieved. Linking of agricultural and forestry policies was highlighted as an important mechanism for attaining this goal.

3.12 Protection of Natural Ecosystems

To encourage countries to develop policies that avoid replacing natural ecosystems of high ecological and cultural values with forest plantations, and preferring native species where appropriate, as noted in IPF recommendation 58.b.ii.

3.13 FAO study of fuel wood, fodder and non-wood forest products

The meeting noted the on-going efforts by FAO to quantify the supply of and demand for fibre (industrial roundwood and timber) and strongly recommended that similar quantitative studies be undertaken on the supply and demand for fuel wood, fodder and non-wood forest products. FAO should also continue to support countries in capacity building.

3.14 Education and information

Education and information exchange should be used to raise awareness of the multiple roles that planted forests may fulfil in ecological, social and economic functions and the advantages and disadvantages of the various management options. Managers of planted forests should acknowledge that a variety of approaches to managing forests are possible, including the use of traditional forest related knowledge.

3.15 Technology transfer

Technology transfer was considered to be a critical issue for the effective development of planted forests. Technology transfer should have the clear objective of transferring appropriate and proven technologies that match the needs of beneficiaries. In addition to the establishment of effective links between research, extension and implementation, it is important that appropriate measures are developed to ensure two-way sharing of technologies, within and between countries. Extensive experience in the development of different types of planted forests exists but it is unevenly distributed. Developing methods for the transfer of this information to the areas of greatest need would be an important mechanism for increasing the effectiveness of establishing planted forests.

4. RECOMMENDATIONS

Taking into account these conclusions, the meeting makes the following recommendations for further deliberation by the Intergovernmental Forum on Forests:

Context

(i) Countries should recognise that the boundary between planted and natural forests is often indistinct. The roles fulfilled by planted forests are diverse, and a continuum of forest types exists from highly protected conservation forests to productive, short rotation planted forests.

(ii) When considering the definition of planted forests, the international community, especially FAO, and individual countries should take into account the need to reflect both the differing degrees of management as well as the different objectives of planted forests.

(iii) To promote policies to reduce unsustainable consumption of forest products in developed countries, focussing on reduction, reuse, recycling and eco-efficiency, while recognising the environmental acceptability of many wood products compared with some alternatives. Efficient and sustainable utilisation should be encouraged in all countries.

Role of Planted Forests

(iv) To promote policies to increase forest area, by planted forests and other means, including trees on farms, in order to meet the rising demand for wood, non-wood forest products and services including carbon sequestration.

(v) To note IPF recommendation 58.b.ii 'taking all practicable steps to avoid replacing natural ecosystems of high ecological and cultural values with forest plantations, ...and preferring native species, where appropriate'.

(vi) To encourage countries, especially with low forest cover, to use planted forests and other means, including trees on farms, as an option for rehabilitating degraded areas and, where possible, as a basis for re-establishing natural forests.

(vii) To encourage the use of environmental impact assessments and other tools to facilitate the development and implementation of sound land-use decisions.

(viii) To take due consideration of environmental, economic, and social principles of SFM, at appropriate levels, in the planning and management of planted forests.

Planted Forests and Wider Issues

(ix) To encourage the development of strategies utilising planted forests, where appropriate, for the conservation and management of forest genetic resources. The utilisation of reproductive material of high genetic quality should also be encouraged.

(x) To urge countries to involve stakeholders effectively in decision making and policy implementation relating to planted forests.

(xi) To request FAO to undertake quantitative studies on the supply and demand for fuel wood, fodder and non-wood forest products and to continue to support countries in capacity building.

(xii) To urge countries to engage in awareness raising of the ecological, social, cultural and economic roles that planted forests may fulfil, and their impacts.

(xiii) To encourage appropriate two-way technology transfer mechanisms for the sustainable development of planted forests. In addition, appropriate means to ensure the sharing of technologies between and within countries should be developed, including effective links between research, extension and implementation.